



General

Guideline Title

Practice parameters for the management of rectal prolapse.

Bibliographic Source(s)

Vanna M, Rafferty J, Buie WD, Standards Practice Task Force of American Society of Colon and Rectal Surgeons. Practice parameters for the management of rectal prolapse. *Dis Colon Rectum*. 2011 Nov;54(11):1339-46. [88 references] [PubMed](#)

Guideline Status

This is the current release of the guideline.

Recommendations

Major Recommendations

The levels of evidence and the grades of recommendations (1A-2C) are defined at the end of the "Major Recommendations" field.

Evaluation of Rectal Prolapse

1. The initial evaluation of a patient with rectal prolapse should include a complete history and physical examination. Grade of Recommendation: Strong recommendation based on low-quality evidence 1C.
Before operative intervention, a careful history and physical examination should be performed. If the diagnosis is suspected from the history, but not detected on physical examination, confirmation can be obtained by asking the patient to reproduce the prolapse by straining while on a toilet with or without use of an enema. Inspection of the perineum with the patient in the sitting or squatting position is helpful for this purpose. A common pitfall in the diagnosis of rectal prolapse is the potential for confusion with prolapsing internal hemorrhoids or rectal mucosal prolapse. Usually, these conditions are easily distinguished by clinical examination. Close inspection of the direction of the prolapsed tissue folds will reveal that in the case of full-thickness rectal prolapse, the folds are always concentric, whereas hemorrhoidal tissue or rectal mucosa develops radial invaginations.

Full inspection of the perineum and complete anorectal examination is equally important. A patulous anus with diminished sphincter tone is usually identified. Proctoscopy reveals a solitary rectal ulcer on the anterior surface of the rectum in 10% to 15% of cases. In the event that the prolapse is still elusive, patients can be asked to photograph the prolapse at home. Twenty to thirty-five percent of patients with rectal prolapse report urinary incontinence, and about 15% to 30% have significant vaginal vault prolapse. These symptoms require evaluation, and potentially, multidisciplinary surgical intervention.
2. Additional tests such as a defecography, colonoscopy, barium enema, and urodynamics can be used selectively to define the diagnosis and identify other important pathology. Grade of Recommendation: Strong recommendation based on moderate-quality evidence 1B.

If the prolapse cannot be produced during the physical examination, then a defecography may reveal the problem. Defecography may also reveal associated defects such as cystocele, vaginal vault prolapse, and enterocele that may, depending on symptoms, require treatment as well. Although uncommon, a neoplasm may form the lead point for a rectal intussusception. For this reason, and because this problem often occurs in the older population, colonoscopy should be performed based on existing guidelines of appropriate screening for colorectal cancer. A significant finding on colonoscopic inspection may change the operative approach. For those patients who also have symptoms of vaginal prolapse or urinary incontinence, urodynamics and urogynecologic examination should be considered because surgical intervention may be needed for both the anterior and posterior compartments of the pelvis.

3. Physiologic testing may be useful to assess functional disorders associated with rectal prolapse, such as constipation or fecal incontinence.

Grade of Recommendation: Weak recommendation based on low-quality evidence 2C.

Anorectal physiology studies rarely change the operative strategy for rectal prolapse, but they can often guide treatment for associated functional abnormalities, in particular, in the postoperative period. Patients will often present with rectal prolapse in the setting of lifelong severe constipation. These patients require special consideration in accordance with the American Society of Colon and Rectal Surgeons (ASCRS) constipation practice parameter. Anorectal physiology testing to assess for pelvic floor dyssynergia and a transit study to rule out colonic inertia should be considered in these situations. Patients with pelvic floor dyssynergia may benefit from postoperative biofeedback, and those who have evidence of surgically amenable slow-transit constipation, and are continent, may be candidates for subtotal colectomy in addition to a rectopexy.

Chronic dilation of the anal sphincter with diminished internal anal sphincter pressures is a common finding and can lead to fecal incontinence. Again, the evaluation of these patients should be in accordance with the ASCRS practice parameter for fecal incontinence and may include endorectal ultrasound to evaluate sphincter defects, and anorectal manometry and pudendal nerve testing, as well. The finding of increased nerve conduction periods (nerve damage) may have postoperative prognostic significance for continence; patients with evidence of nerve damage may have a higher rate of incontinence following surgical correction of the prolapse.

Nonoperative Management

1. Although many patients who present with rectal prolapse are older and have multiple comorbidities, there is little nonoperative treatment available for symptomatic rectal prolapse. Grade: Weak recommendation based on low-quality evidence 2C.

Addressing symptoms of constipation using fiber and stool softeners may be of use. Table sugar has been used to reduce incarcerated rectal prolapse by absorbing the edema of the rectal prolapse, thus making it easier to reduce. However, this does not definitively treat the condition.

Operations for Rectal Prolapse

Surgery is the mainstay for treatment of rectal prolapse.

Two predominant general approaches, abdominal and perineal, are considered in the operative repair of rectal prolapse. The surgical approach is dictated by the comorbidities of the patient, the surgeon's preference and experience, and the patient's age and bowel function.

Abdominal Procedures for Rectal Prolapse

1. In patients with acceptable risk, procedures incorporating transabdominal rectal fixation are typically the procedure of choice for the treatment of rectal prolapse. Grade of Recommendation: Strong recommendation based on moderate-quality evidence 1B.

Suture Rectopexy

1. Rectopexy is a key component in the abdominal approach to rectal prolapse. Grade of Recommendation: Strong recommendation based on low-quality evidence 1C.

Rectopexy can also produce new-onset or worsened constipation. The precise etiology of constipation is unclear. Mechanical as well as functional reasons for constipation should be considered.

2. A sigmoid resection may be added to rectopexy in patients with prolapse and preoperative constipation, but it is not necessary in those without constipation. Grade of Recommendation: Strong recommendation based on moderate-quality evidence 1B.
3. Division of the lateral stalks during rectal dissection may worsen symptoms of constipation postoperatively, but it is associated with decreased recurrence rates. Grade of Recommendation: Weak recommendation based on moderate-quality evidence 2B.

Mesh Rectopexy

1. The Ripstein procedure with fixation of mesh from the anterior rectal wall to the sacral promontory after posterior mobilization may be used

for treatment of rectal prolapse, but it is associated with higher morbidity. Grade of Recommendation: Strong recommendation based on low-quality evidence 1C.

Prosthetic materials have long been used to affix the rectum to the sacrum to treat rectal prolapse. The Ripstein repair (and its many iterations) involves placement of a prosthetic mesh around the mobilized rectum with attachment of the mesh to the presacral fascia below the sacral promontory.

2. A modified Wells procedure using a variety of foreign materials for posterior fixation of the rectum may be used for treatment of rectal prolapse. Grade of Evidence: Weak recommendation based on moderate-quality evidence 2B.
3. The ventral mesh rectopexy reduces constipation by avoiding posterolateral mobilization of the rectum and produces results similar to other abdominal approaches. Grade of Recommendation: Weak recommendation based on moderate-quality evidence 2B.

Anterior Resection

1. The use of anterior resection alone to treat rectal prolapse is associated with higher recurrence rates and significant operative and postoperative morbidity; it should not be considered as a first-line treatment. Grade of recommendation: Strong recommendation based on moderate-quality evidence 1B.

Careful selection of patients is necessary for this procedure, and, in general, given the slightly higher recurrence rates and lack of functional advantages, it is not widely practiced.

Adjunctive Operative Techniques for Abdominal Procedures

1. A minimally invasive approach to rectal prolapse by experienced surgeons compares favorably with an open repair. Grade of Evidence: Strong recommendation based on moderate-quality evidence 1B.

All abdominal approaches to rectal prolapse have been performed laparoscopically over the past decade with essentially similar results. The indications for performing a laparoscopic procedure are primarily related to the indications for an abdominal approach; patients without previous abdominal surgery are excellent candidates, but prior pelvic surgery is not necessarily an exclusion criterion. The actual surgical technique to perform laparoscopic rectopexy or resection is the same as that used for open repairs. The goals of surgery remain the same, to eradicate the full thickness rectal prolapse, improve bowel function and continence, and minimize recurrence rates. However, recurrence rates should be judged in light of the length of follow-up, because a significant percentage of recurrences may occur several years after treatment.

Perineal Operations for Rectal Prolapse

1. Patients with a short, full-thickness rectal prolapse can be treated with a mucosal sleeve resection; but, for a longer prolapse, it is associated with a higher recurrence rate compared with abdominal approaches. Grade of Recommendation: Strong recommendation based on low-quality evidence 1C.

For patients with a short, full-thickness rectal prolapse or a mucosal prolapse, a Delorme procedure can be performed. It involves a circumferential mucosal sleeve resection and imbrication of the muscularis layer with serial vertical sutures. This procedure is advocated for those who are considered "high risk" for an abdominal procedure because of comorbidities or to avoid risk of nerve damage.

2. Patients with a full-thickness rectal prolapse who are not candidates for an abdominal operation may be treated with a perineal rectosigmoidectomy but are susceptible to higher recurrence rates in comparison with abdominal approaches. Grade of Recommendation: Strong recommendation based on low-quality evidence 1C.

Perineal rectosigmoidectomy involves the full-thickness resection of the rectum and sigmoid colon via the anus with a coloanal anastomosis by the use of sutures or a stapling device.

Definitions:

The Grading of Recommendation, Assessment, Development, and Evaluation (GRADE) System—Grading Recommendations^a

	Description	Benefit versus Risk and Burdens	Methodological Quality of Supporting Evidence	Implications
1A	Strong recommendation, high-quality evidence	Benefits clearly outweigh risk and burdens or vice versa	RCTs without important limitations or overwhelming evidence from observational studies	Strong recommendation, can apply to most patients in most circumstances without reservation

1B	Strong recommendation, moderate-quality evidence	Benefits clearly outweigh risk and burdens or vice versa	RCTs with important limitations (inconsistent results, methodologic flaws, indirect, or imprecise) or exceptionally strong evidence from observational studies	Strong recommendation, can apply to most patients in most circumstances without reservation
1C	Strong recommendation, low- or very-low-quality evidence	Benefits clearly outweigh risk and burdens or vice versa	Observational studies or case series	Strong recommendation but may change when higher quality evidence becomes available
2A	Weak recommendation, high-quality evidence	Benefits closely balanced with risks and burdens	RCTs without important limitations or overwhelming evidence from observational studies	Weak recommendation, best action may differ depending on circumstances or patients' or societal values
2B	Weak recommendations, moderate-quality evidence	Benefits closely balanced with risks and burdens	RCTs with important limitations (inconsistent results, methodologic flaws, indirect, or imprecise) or exceptionally strong evidence from observational studies	Weak recommendation, best action may differ depending on circumstances or patients' or societal values
2C	Weak recommendation, low- or very-low-quality evidence	Uncertainty in the estimates of benefits, risks and burden; benefits, risk and burden may be closely balanced	Observational studies or case series	Very weak recommendations; other alternatives may be equally reasonable

RCT = randomized controlled trial

^aAdapted from Guyatt G, Guterma D, Baumann MH, et al. Grading strength of recommendations and quality of evidence in clinical guidelines: report from an American College of Chest Physicians Task Force. Chest. 2006;129:174–181.

Clinical Algorithm(s)

None provided

Scope

Disease/Condition(s)

Rectal prolapse

Guideline Category

Diagnosis

Evaluation

Management

Treatment

Clinical Specialty

Colon and Rectal Surgery

Family Practice

Gastroenterology

Internal Medicine

Intended Users

Advanced Practice Nurses

Health Care Providers

Nurses

Patients

Physician Assistants

Physicians

Guideline Objective(s)

To provide practice parameters for the management of rectal prolapse

Target Population

Patients with rectal prolapse

Interventions and Practices Considered

Assessment

1. Complete patient history
2. Physical examination
3. Additional tests
 - Defecography
 - Colonoscopy
 - Barium enema
 - Urodynamics
4. Physiologic testing

Management/Treatment

1. Non-operative management (fiber, stool softeners)
2. Surgery
 - Abdominal procedures (suture rectopexy, mesh rectopexy, anterior resection)
 - Adjunctive operative techniques for abdominal procedures (laparoscopic approach)
 - Perianal operations (mucosal sleeve resection, rectosigmoidectomy)

Major Outcomes Considered

- Improvement of symptoms
- Perioperative complications, morbidity, and pain
- Perioperative mortality
- Recurrence rates

- Functional outcomes

Methodology

Methods Used to Collect/Select the Evidence

Hand-searches of Published Literature (Primary Sources)

Hand-searches of Published Literature (Secondary Sources)

Searches of Electronic Databases

Description of Methods Used to Collect/Select the Evidence

An organized search of MEDLINE/PubMed and the Cochrane Database of Systematic Reviews and Clinical Trials was performed, from 1978 to June 2010, using the key words "rectal prolapse," "procidentia," "laparoscopy," "suture rectopexy," "mesh rectopexy, resection rectopexy," "perineal rectosigmoidectomy." Selected embedded references were also reviewed. All English language manuscripts and studies of adults were reviewed.

Number of Source Documents

Not stated

Methods Used to Assess the Quality and Strength of the Evidence

Weighting According to a Rating Scheme (Scheme Given)

Rating Scheme for the Strength of the Evidence

See the "Rating Scheme for the Strength of the Recommendations" field, below.

Methods Used to Analyze the Evidence

Review of Published Meta-Analyses

Systematic Review

Description of the Methods Used to Analyze the Evidence

Not stated

Methods Used to Formulate the Recommendations

Expert Consensus

Description of Methods Used to Formulate the Recommendations

Recommendations were formulated by the primary authors and reviewed by the entire committee. The final grade of recommendation was performed using the Grades of Recommendation, Assessment, Development, and Evaluation (GRADE) system (see the "Rating Scheme for the

Strength of Recommendations" field) and reviewed by the entire Standards Committee.

Rating Scheme for the Strength of the Recommendations

The Grading of Recommendation, Assessment, Development, and Evaluation (GRADE) System—Grading Recommendations^a

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Cost Analysis

Recent applications of robotic surgery for colorectal conditions have focused on pelvic operations because of the ease of maintaining one field for the procedure. Disadvantages include longer operating time and cost.

Method of Guideline Validation

Not stated

Description of Method of Guideline Validation

Not applicable

Evidence Supporting the Recommendations

Type of Evidence Supporting the Recommendations

The type of supporting evidence is identified and graded for each recommendation (see the "Major Recommendations" field).

Benefits/Harms of Implementing the Guideline Recommendations

Potential Benefits

Appropriate management of rectal prolapse

Potential Harms

- Rectopexy can also produce new-onset or worsened constipation. Fifteen percent of patients experience constipation for the first time following rectopexy, and at least 50% of those who are constipated preoperatively are made worse. The precise etiology of constipation is unclear. Mechanical as well as functional reasons for constipation should be considered.
- Recurrence rates after resection rectopexy are low, ranging from 2% to 5%, and major complication rates range from 0% to 20% and relate either to obstruction or anastomotic leak.
- Independent of the technique used to perform the rectopexy, the division of the lateral stalks during the rectal dissection has been associated with worsening constipation.
- Recurrence rates after Ripstein procedures are similar. Postoperative morbidity rates are 20%, but most of these complications are minor.
- New onset of constipation after ventral rectopexy was noted to be 14.4%.
- In one review of 113 patients, the recurrence rate continued to climb after 2, 5, and 10 years to 3%, 6%, and 12%, with an operative morbidity of 29%, including 3 anastomotic leaks. Another review confirmed that, with an average follow-up of 6 years, recurrence occurred in 7% of cases. A low pelvic anastomosis in those with borderline continence may cause complete loss of control.
- Recurrence rates after laparoscopic treatment of rectal prolapse should be judged in light of the length of follow-up, because a significant percentage of recurrences may occur several years.
- Recurrence rates after mucosal sleeve resection are higher than the abdominal approaches in the range of 10% to 15%. Complications such as infection, urinary retention, bleeding, and fecal impaction occur in 4% to 12% of cases. Constipation and fecal incontinence improve following surgery, but urgency and tenesmus do occur.
- Perineal rectosigmoidectomy can be performed without general anesthesia, involves a shorter hospital stay, and has lower complication rates (<10%), which include bleeding from the staple or suture line, pelvic abscess, and, rarely, an anastomotic leak. However, recurrence rates have been reported to be as high as 16% to 30%.

Qualifying Statements

Qualifying Statements

- These guidelines are inclusive, and not prescriptive. Their purpose is to provide information on which decisions can be made, rather than dictate a specific form of treatment.
- It should be recognized that these guidelines should not be deemed inclusive of all proper methods of care or exclusive of methods of care reasonably directed to obtaining the same results. The ultimate judgment regarding the propriety of any specific procedure must be made by the physician in light of all of the circumstances presented by the individual patient.
- The practice parameters set forth in this document have been developed from sources believed to be reliable. The American Society of Colon and Rectal Surgeons makes no warranty, guarantee, or representation whatsoever as to the absolute validity or sufficiency of any

parameter included in this document, and the Society assumes no responsibility for the use of the material contained.

Implementation of the Guideline

Description of Implementation Strategy

An implementation strategy was not provided.

Implementation Tools

Patient Resources

For information about availability, see the *Availability of Companion Documents* and *Patient Resources* fields below.

Institute of Medicine (IOM) National Healthcare Quality Report Categories

IOM Care Need

Getting Better

IOM Domain

Effectiveness

Patient-centeredness

Identifying Information and Availability

Bibliographic Source(s)

Varma M, Rafferty J, Buie WD, Standards Practice Task Force of American Society of Colon and Rectal Surgeons. Practice parameters for the management of rectal prolapse. *Dis Colon Rectum*. 2011 Nov;54(11):1339-46. [88 references] [PubMed](#)

Adaptation

Not applicable: The guideline was not adapted from another source.

Date Released

2011 Nov

Guideline Developer(s)

American Society of Colon and Rectal Surgeons - Medical Specialty Society

Source(s) of Funding

American Society of Colon and Rectal Surgeons

Guideline Committee

Standards Practice Task Force of the American Society of Colon and Rectal Surgeons

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Financial Disclosures/Conflicts of Interest

Not stated

Guideline Status

This is the current release of the guideline.

Guideline Availability

Electronic copies: Available in Portable Document Format (PDF) from the [American Society of Colon and Rectal Surgeons Web site](#)

Print copies: Available from the ASCRS, 85 W. Algonquin Road, Suite 550, Arlington Heights, Illinois 60005.

Availability of Companion Documents

None available

Patient Resources

The following is available:

- Rectal prolapse. 2008. Available from the [American Society of Colon and Rectal Surgeons \(ASCRS\) Web site](#) .

Please note: This patient information is intended to provide health professionals with information to share with their patients to help them better understand their health and their diagnosed disorders. By providing access to this patient information, it is not the intention of NGC to provide specific medical advice for particular patients. Rather we urge patients and their representatives to review this material and then to consult with a licensed health professional for evaluation of treatment options suitable for them as well as for diagnosis and answers to their personal medical questions. This patient information has been derived and prepared from a guideline for health care professionals included on NGC by the authors or publishers of that original guideline. The patient information is not reviewed by NGC to establish whether or not it accurately reflects the original guideline's content.

NGC Status

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